

WHAT IS CLAIMED IS:

*Claim A1* 1. A heat exchanger core comprising:

a pair of header members being spaced with a predetermined clearance therebetween and disposed opposite to each other;

5 tubes and corrugated fins which are interposed between said pair of header members and are arranged alternately; and  
*(M)* a reinforcement member being provided on ends of said mutually-opposing header members,

wherein each of said header members has tube holes into  
10 which ends of said tubes are fixedly inserted and reinforcement  
*holes* into which ends of said reinforcement members are fixedly  
inserted,

wherein each of said reinforcement holes is formed so as to be of the same size as or larger than each of said tube holes,

15 and

wherein an interval between said reinforcement hole and said tube hole adjacent to said reinforcement hole is made equal to an interval between adjacent tube holes.

*Claim B1* 2. A heat exchanger core according to claim 1, wherein

wherein each of said tube holes is formed so as to be of the same size as each of said reinforcement holes.

3. A heat exchanger core according to claim 2, wherein

25 said reinforcement hole comprises circular-arch sections being formed at both ends thereof and a linear section being formed between said circular-arch sections,

an insertion section is formed at the end of said

reinforcement member so as to have a rectangular cross section and be fixedly inserted into said reinforcement hole, and a width of said insertion section is made smaller than a width of said reinforcement hole as well as larger than a length of 5 the linear section so that said insertion section is inserted into said reinforcement holes by press-fitting.

4. A heat exchanger core according to claim 1, wherein an interval between the linear section on a side of the adjacent tube hole of said reinforcement hole and an end face of said header member is made smaller than a value obtained by adding a size of a shorter side of said tube hole to the interval between the adjacent tube holes.

15 5. A heat exchanger core comprising:  
a pair of header members being spaced with a predetermined clearance therebetween and disposed opposite to each other; and tubes and corrugated fins which are interposed between said pair of header members and are arranged alternately,  
20 a reinforcement member being provided on ends of said mutually-opposing header members,  
wherein each of said header members has tube holes into which ends of said tubes are fixedly inserted and reinforcement holes into which ends of said reinforcement members are fixedly inserted, said reinforcement member comprises a reinforcing section having a C-shaped cross section and insertion sections 25 which are integrally formed with opposite ends of said reinforcing section, and a width of said reinforcement member

is smaller than a width of said corrugated fin.

6. A heat exchanger core according to claim 5, wherein  
a width of said insertion section of said reinforcement member  
5 is substantially equal to a width of said tube.

7. A heat exchanger core according to claim 5, wherein  
notches are formed on opposite sides of a base end section of  
said insertion section of said reinforcement member.

8. A heat exchanger core according to claim 5, wherein  
chamfered sections are formed on opposite sides of a tip end  
of said insertion section.

15 9. A method of assembling a heat exchanger core  
comprising steps of:

guiding fins along a horizontal guide surface formed in  
a base member;

20 guiding both ends of tubes and insertion sections of  
reinforcement members into tube guides which are provided on  
opposite sides of the base member while arranging alternately  
the fins and the tubes;

25 placing the reinforcement members at either end in the  
direction of arrangement of the fins and the tubes to thereby  
constitute a core section; and

attaching header members to opposite sides of the core  
section.

RSS #2  
Add B2